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APPLICATION NO.	F	TLING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/981,219		10/16/2001	William A. Linton	016026-9263-01	5594
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MICHAEL BEST & FRIEDRICH, LLP ONE SOUTH PINCKNEY STREET PO BOX 1806 MADISON, WI 53701

EXAMINER NGUYEN, KIMBERLY D PAPER NUMBER ART UNIT

DATE MAILED: 04/09/2003

Please find below and/or attached an Office communication concerning this application or proceeding.

	Application No.	Applicant(s)	Ţ.
	09/981,219	LINTON ET AL.	/
Office Action Summary	Examiner	Art Unit	
	Kimberly D. Nguyen	2876	
The MAILING DATE of this communication app Period for Reply			
A SHORTENED STATUTORY PERIOD FOR REPL' THE MAILING DATE OF THIS COMMUNICATION. - Extensions of time may be available under the provisions of 37 CFR 1.1 after SIX (6) MONTHS from the mailing date of this communication. - If the period for reply specified above is less than thirty (30) days, a replication of the period for reply is specified above, the maximum statutory period of Failure to reply within the set or extended period for reply will, by statute. - Any reply received by the Office later than three months after the mailing earned patent term adjustment. See 37 CFR 1.704(b). Status	36(a). In no event, however, may a y within the statutory minimum of thir will apply and will expire SIX (6) MON cause the application to become Al	reply be timely filed ty (30) days will be considered timely VTHS from the mailing date of this communic BANDONED (35 U.S.C. § 133).	cation
1) Responsive to communication(s) filed on	·		
2a) ☐ This action is FINAL . 2b) ☐ Th	is action is non-final.		
3) Since this application is in condition for allows closed in accordance with the practice under Disposition of Claims	ance except for formal ma Ex parte Quayle, 1935 C.	atters, prosecution as to the mer D. 11, 453 O.G. 213.	rits is
4) Claim(s) 1-33 is/are pending in the application	1.		
4a) Of the above claim(s) is/are withdra			
5) Claim(s) is/are allowed.			
6) Claim(s) <u>1-14,18-25 and 28-33</u> is/are rejected			
7) Claim(s) <u>15-17,26 and 27</u> is/are objected to.			
8) Claim(s) are subject to restriction and/o	or election requirement.		
Application Papers			
9)☐ The specification is objected to by the Examine			
10)☐ The drawing(s) filed on is/are: a)☐ acce			
Applicant may not request that any objection to the			
11) The proposed drawing correction filed on		disapproved by the Examiner.	
If approved, corrected drawings are required in re			
12) ☐ The oath or declaration is objected to by the E	xaminer.		
Priority under 35 U.S.C. §§ 119 and 120			
13) Acknowledgment is made of a claim for foreig	n priority under 35 U.S.C.	§ 119(a)-(d) or (f).	
a) All b) Some * c) None of:			
 Certified copies of the priority document 			
2. Certified copies of the priority documen			
3. Copies of the certified copies of the price application from the International B* See the attached detailed Office action for a lise	ureau (PCT Rule 17.2(a)) t of the certified copies no	ot received.	
14) Acknowledgment is made of a claim for domes	tic priority under 35 U.S.C	C. § 119(e) (to a provisional app	lication).
a) ☐ The translation of the foreign language po 15)☐ Acknowledgment is made of a claim for domes	rovisional application has stic priority under 35 U.S.C	been received. C. §§ 120 and/or 121.	
Attachment(s)			
 Notice of References Cited (PTO-892) Notice of Draftsperson's Patent Drawing Review (PTO-948) Information Disclosure Statement(s) (PTO-1449) Paper No(s) 	5) Notice of	w Summary (PTO-413) Paper No(s) of Informal Patent Application (PTO-152	

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DETAILED ACTION

Specification

1. The abstract of the disclosure is objected to because the abstract should be in a single paragraph. Correction is required. See MPEP § 608.01(b).

Claim Rejections - 35 USC § 103

- 2. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:
 - (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.
- 3. Claims 1-6, 28-30 are rejected under 35 U.S.C. 103(a) as being unpatentable over de Prins (US 4,866,661) in view of Vega et al. (US 6.218.942; hereinafter "Vega").

de Prins teaches a method of distributing a plurality of products from a lock cabinet having a door (see fig. 4; abstract; col. 6, lines 3-8), the method comprising:

positioning the plurality of products cabinet (figs. 1A and 24A-24B; col. 15, lines 45+; col. 42, lines 34-43);

sensing opening and closing of the cabinet door (figs. 24A-24B; col. 43, lines 9-14); scanning the plurality of products in the cabinet upon sensing closing of the cabinet door to determine the number and type of products in the cabinet (figs. 24A-24B and 26A-26B; col. 42, lines 34-43; col. 42, line 63 through col. 43, 28; col. 47, line 51 through col. 48, line 4); generating a message based on the number and type of products in the cabinet (col. 42. lines 27-43; col. 46, lines 5-19);

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transmitting the message/data to a server (fig. 2; col. 17, lines 19-23; col. 18, lines 25-49); and

maintaining a inventory in the server based on the message (col. 18, line 25-42).

de Prins teaches a barcode is placed on each item/product (col. 6, line 64 through col. 7. line 10).

de Prins fails to teach or fairly suggest that each product is fitted with a radio frequency identification tag.

Vega teaches a method of distributing a plurality of products from a warehouse, wherein each product 110 is secured with an radio frequency identification (RFID) tag 112, and the advantage of using RFID tag over barcode label/tag (fig. 1; col. 10, lines 43-56; col. 11, lines 3-18).

It would have been obvious to an artisan of ordinary skill in the art at the time the invention was made to incorporate the radio frequency identification tag system and the advantage of using the RFID tag over the barcode label as taught by Vega to the teachings of de Prins in order provide a tracking system without regarding to the orientation of the product or without line of sight access to the tag as required by barcode system (col. 10, lines 43-56). Furthermore. RFID tag system as taught by Vega may be arranged to generate write signal. which is updating the information within the RFID tag directly, which provides a tremendous advantage over barcode and other similar optical system (col. 11, lines 3-18): therefore, it would have been an obvious extension as taught by de Prins.

Re claims 2, 4, 6, 29: de Prins teaches a method of distributing a plurality of products from a lock cabinet having a door, further comprising:

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reading a code on a user card, which serves as user badge;

acknowledging having read the user card/badge:

determining the authenticity of the code read from the user card/badge; and

opening the cabinet if the code read from the user card/badge is authentic(figs. 6, 7 and 11: col. 22, line 61 through col. 23, line 57; col. 24, lines 37-54).

Re claim 3, 30: de Prins teaches a method of distributing a plurality of products from a lock cabinet having a door, wherein there is a time period beginning when the cabinet doors are open and until the ending of the time period when the cabinet doors are closed (col. 6, lines 23-45).

It would have been obvious to an artisan of ordinary skill in the art at the time the invention was made to incorporate the time period of opening and closing the cabinet doors as taught by de Prins in order to modify de Prins' teachings to closing the cabinet after a predetermined amount of time as claimed in the instant invention to further ensure the cabinet door is closed at any unnecessary time. Such modification would provide more security to the system; therefore, it would have been an obvious extension taught by de Prins.

4. Claim 7 is rejected under 35 U.S.C. 103(a) as being unpatentable over de Prins as modified by Vega as applied to claim 1 above, and further in view of Huffman et al. (US 6.170.285; hereinafter "Huffman"). The teachings of Prins as modified by Vega have been discussed above.

Although, de Prins teaches a vending system, which may be used for rental, sale, stock or inventory for a supermarket (col. 6, lines 3-8).

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de Prins as modified by Vega is silent with respect to the step of sensing the temperature of the cabinet.

Huffman teaches a vending machine 10, comprising the step of sensing the temperature of the cabinet 12 (see figs. 1 and 11; col. 5, lines 28-58).

It would have been obvious to an artisan of ordinary skill in the art at the time the invention was made to incorporate the sensing the temperature of the cabinet as taught by Huffman to the teachings of de Prins as modified by Vega in order to provide a vending machine with a self-contained refrigeration and heating to further provide a desired temperature for the goods/foods within the vending machine (col. 2, lines 6-15). Such modification would have been an obvious expedient as taught by de Prins as modified by Vega.

5. Claims 8-9 are rejected under 35 U.S.C. 103(a) as being unpatentable over de Prins as modified by Vega as applied to claim 1 above, and further in view of Wright (US 5.285.041: hereinafter "Wright"). The teachings of de Prins as modified by Vega have been discussed above.

de Prins as modified by Vega fails to teach or fairly suggest tracking the time each of the plurality of products spends in the cabinet.

Wright teaches a vending system, further comprising denying access to the system until the temperature reaches a predetermined level, and tracking the time each of the plurality of products spends in the cabinet (abstract: col. 2, lines 28-40; col. 8, line 39 through col. 9, line 28).

It would have been obvious to an artisan of ordinary skill in the art at the time the invention was made to incorporate denying access to the system until the temperature reaches a

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predetermined level and tracking the time each of the plurality of products spends in the cabinet as taught by Wright to the teachings of de Prins as modified by Vega in order to obtain a time tracking system for the foods/goods which spend in the cabinet to further provide convenience to the customer/user/operator for monitoring the goods (i.e., to prevent spoiled foods from dispensing to the customer/user/operator).

6. Claims 10-11 are rejected under 35 U.S.C. 103(a) as being unpatentable over de Prins as modified by Vega and Wright as applied to claim 9 above, and further in view of Schier et al. (US 3,861,433; hereinafter "Schier"). The teachings of de Prins as modified by Vega and Wright have been discussed above.

de Prins as modified by Vega and Wright fails to teaches or fairly suggest comparing the time each of the plurality of products spends in the cabinet to a shelf life for each of the plurality of products.

Schier teaches comparing the time the product spends in the cabinet to a shelf life for each product (col. 1, lines 15-35).

It would have been obvious to an artisan of ordinary skill in the art at the time the invention was made to incorporate comparing the time the product spends in the cabinet to a shelf life for each product as taught by Schier to the teachings of de Prins as modified by Vega and Wright in order to prevent the recalled or over dated product from dispensing to the customer/user. Such modification would have been an obvious expedient as taught by de Prins as modified by Vega and Wright to further ensure that the customer/user are getting quality products.

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7. Claim 12 is rejected under 35 U.S.C. 103(a) as being unpatentable over de Prins as modified by Vega as applied to claim 1 above, and further in view of Schier. The teachings of de Prins as modified by Vega have been discussed above.

de Prins as modified by Vega fails to teaches or fairly suggest scanning the products in the cabinets and determining whether any of the products have a recall status.

Schier teaches scanning the products in the cabinets and determining whether any of the products have a recall status (col. 1, lines 15-35).

It would have been obvious to an artisan of ordinary skill in the art at the time the invention was made to incorporate comparing the time the product spends in the cabinet to a shelf life for each product as taught by Schier to the teachings of de Prins as modified by Vega in order to prevent the recalled or over dated product from dispensing to the customer/user. Such modification would have been an obvious expedient as taught by de Prins as modified by Vega to further ensure that the customer/user are getting quality products.

8. Claims 13 and 18 are rejected under 35 U.S.C. 103(a) as being unpatentable over de Prins as modified by Vega as applied to claim 1 above, and further in view of Vogel (US 5.117.407). The teachings of de Prins as modified by Vega have been discussed above.

de Prins as modified by Vega fails to teach or fairly suggest the message contains information regarding the status of individual products.

Vogel teaches a message corresponding to the information of the product/merchandise (fig. 1; col. 1, lines 30-43; col. 2, lines 37-61).

It would have been obvious to an artisan of ordinary skill in the art at the time the invention was made to incorporate the message corresponding to the information of the product

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as taught by Vogel to the teachings of de Prins as modified by Vega in order to provide message regarding each merchandise/product to better track the merchandise/product through the storing, delivery, and dispensing process.

9. Claim 14 is rejected under 35 U.S.C. 103(a) as being unpatentable over de Prins as modified by Vega and Vogel as applied to claim 13 above, and further in view of Wright. The teachings of de Prins as modified by Vega and Vogel have been discussed above.

de Prins as modified by Vega and Vogel fails to teach or fairly suggests the status of individual products includes product's type, temperature history, and time spent in the microwarehouse.

Wright teaches a vending system, wherein the status of individual includes products's type, temperature history, and time spent in the micro-warehouse (abstract; col. 2, lines 28-40; col. 8, line 39 through col. 9, line 28).

It would have been obvious to an artisan of ordinary skill in the art at the time the invention was made to incorporate the status of individual includes products's type, temperature history, and time spent in the micro-warehouse as taught by Wright to the teachings of de Prins as modified by Vega and Vogel in order to obtain a time tracking system for the foods/goods which spend in the cabinet to further provide convenience to the customer/user/operator for monitoring the goods (i.e., to prevent spoiled foods from dispensing to the customer/user/operator).

10. Claims 19 and 21 are rejected under 35 U.S.C. 103(a) as being unpatentable over de Prins in view of Vega and Melzer et al. (US 6.305.609; hereinafter "Melzer").

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de Prins teaches a system for distributing a plurality of products (abstract; col. 6, lines 3-8), the system comprising:

a movie rental machine (fig. 4), which serves as a micro-warehouse, having an output device (col. 17, lines 53-59).

a door with a proximity sensor (figs. 24A-24B; col. 43, lines 9-14),

a controller (fig. 19) coupled to the proximity sensor; and

a server coupled to the controller to receive data, such as inventory data, which serves as the message (fig. 2; col. 17, lines 19-23; col. 18, lines 25-49).

de Prins teaches a barcode is placed on each item/product (col. 6, line 64 through col. 7, line 10) and a controller (fig. 19) to control for scanning the plurality of products and determine the identity of each of the products, and to create a message including the identity of each of the product (col. 42, lines 34-43).

de Prins fails to teach or fairly suggest that each product having a radio frequency identification tag.

Vega teaches a method of distributing a plurality of products from a warehouse, wherein each product 110 is secured with an radio frequency identification (RFID) tag 112, and the advantage of using RFID tag over barcode label/tag (fig. 1; col. 10, lines 43-56; col. 11, lines 3-18).

It would have been obvious to an artisan of ordinary skill in the art at the time the invention was made to incorporate the radio frequency identification tag system and the advantage of using the RFID tag over the barcode label as taught by Vega to the teachings of de Prins in order provide a tracking system without regarding to the orientation of the product or

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without line of sight access to the tag as required by barcode system (col. 10, lines 43-56). Furthermore, RFID tag system as taught by Vega may be arranged to generate write signal, which is updating the information within the RFID tag directly, which provides a tremendous advantage over barcode and other similar optical system (col. 11, lines 3-18); therefore, it would have been an obvious extension as taught by de Prins.

de Prins teaches a user card, which serves as a user badge, having a code (figs. 6, 7 and 10; col. 22, line 61 through col. 23, line 57; col. 24, lines 37-54).

de Prins as modified by Vega fails to teach or fairly suggest the radio frequency user badge/card.

Melzer teaches the benefits of using contactless card (RFID) card over the magnetic stripe or contact areas card (col. 1, line 62 through col. 2, line 8).

It would have been obvious to an artisan of ordinary skill in the art at the time the invention was made to incorporate the benefits of using contactless/RFID card over the magnetic stripe or contact areas card as taught by Melzer to the teachings of de Prins as modified by Vega in order to avoid inserting the card into the card reader, which causes wear and tear to the card (col. 1, line 66 through col. 2, line 1). Furthermore, contactless/RFID card has the benefit that no technical elements are visible on the card surface, so that the visual configuration of the card surface is not restricted by magnetic strips or contact areas (col. 2, lines 6-8). Therefore, it would have been an obvious expedient as taught by Prins as modified by Vega to further employ the latest card technology, which is contactless/RFID card.

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11. Claim 20 is rejected under 35 U.S.C. 103(a) as being unpatentable over de Prins as modified by Vega and Melzer as applied to claim 19 above, and further in view of Huffman. The teachings of Prins as modified by Vega and Melzer have been discussed above.

de Prins as modified by Vega and Melzer is silent with respect to the temperature sensor mounted in the micro-warehouse and coupled to the controller.

Huffman teaches a vending machine 10, which serves as the micro-warehouse, comprising a temperature sensor (see figs. 1 and 11; col. 5, lines 28-58).

It would have been obvious to an artisan of ordinary skill in the art at the time the invention was made to incorporate the temperature sensor of the cabinet as taught by Huffman to the teachings of de Prins as modified by Vega and Melzer in order to provide a vending machine with a self-contained refrigeration and heating to further provide a desired temperature for the goods/foods within the vending-machine/micro-warehouse (col. 2, lines 6-15). Such modification would have been an obvious expedient as taught by de Prins as modified by Vega and Melzer.

12. Claims 21-25 are rejected under 35 U.S.C. 103(a) as being unpatentable over de Prins as modified by Vega and Melzer as applied to claim 19 above, and further in view of Gibb (US 5,930,766). The teachings of de Prins as modified by Vega and Melzer have been discussed above.

Although, de Prins teaches a system for distributing a plurality of products, wherein the system includes a plurality of micro-warehouses/cabinets (fig. 1C; col. 16, line 46 through col. 17, line 12) and the server (not shown) (col. 18, lines 43-49).

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de Prins as modified by Vega and Melzer fails to teach or fairly suggest that the server includes a database.

Gibb teaches a a system for distributing a plurality of products, including a plurality of bars 3, and the server 5 receives and store information provided by the bar controllers (fig. 1: col. 3, lines 28-40), which serves as a server includes a database.

It would have been obvious to an artisan of ordinary skill in the art at the time the invention was made to incorporate the server including the database as taught by Gibb to the teachings of de Prins as modified by Vega and Melzer in order to provide a central information processing/storage unit to further obtain all related data in one place.

Re claims 22-23: Although, de Prins teaches a system for distributing a plurality of products, including a registration module (figs. 2 and 11; col. 24, lines 37-54) and order history module (col. 52, lines 9-16), which reside in the CPU 204.

de Prins as modified by Vega and Melzer fails to teach or fairly suggest the server includes a registration module.

It would have been an obvious expedient to modify the storage location of the registration and order history modules from a local to a remote/server location to further maintain, update and modify data at easily at the same place.

13. Claims 31-33 are rejected under 35 U.S.C. 103(a) as being unpatentable over de Prins as modified by Vega as applied to claim 29 above, and further in view of Gibb (US 5.930.766).

The teachings of de Prins as modified by Vega have been discussed above.

de Prins teaches the step of determining authenticity (figs. 6, 7 and 11; col. 22, line 61 through col. 23, line 57; col. 24, lines 37-54).

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de Prins as modified by Vega fails to teach or fairly suggest the server.

Gibb teaches a a system for distributing a plurality of products, including a plurality of bars 3, and the server 5 receives and store information provided by the bar controllers (fig. 1; col. 3, lines 28-40).

It would have been obvious to an artisan of ordinary skill in the art at the time the invention was made to incorporate the server for processing information regarding a plurality of bars/vending-machines as taught by Gibb to the teachings of de Prins as modified by Vega in order to provide a server, which takes care of all the authentication and information related to the business; therefore, it would have been an obvious extension.

Allowable Subject Matter

- 14. Claims 15-17 and 26-27 are objected to as being dependent upon a rejected base claim. but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.
- 15. The following is a statement of reasons for the indication of allowable subject matter:

The record of prior art fails to teach the vending machine as set forth in claim 1, wherein the server uses a self-updating boot up procedure, the procedure comprising:

receiving a message containing a most recent software version number:

comparing a software version number currently used to the most recent software version number:

downloading the most recent software version if versions differ when compared: writing the downloaded software to memory; and

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booting the downloaded software, as set forth in the claims.

Conclusion

16. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure. Walsh et al. (US 6,144,848) teaches handheld remote computer control and methods for secured interactive real time telecommunications. Park (US 5,231,844) teaches defrost control method for refrigerator. Pires et al. (US 6,431,438) teaches system and device fro storing objects.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Kimberly D. Nguyen whose telephone number is 703-305-1798. The examiner can normally be reached on Monday-Friday 7:30-4:30.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor. Michael G. Lee can be reached on 703-305-3503. The fax phone numbers for the organization where this application or proceeding is assigned are 703-305-1341 for regular communications and 703-305-1341 for After Final communications.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is 703-308-8792.

KDN March 27, 2003

MICHAEL G LEE SUPERVISORY PATENT EXAMINER TECHNOLOGY CENTER 2800